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DEVELOP NEW TEXTILE MACHINERY;  
KOLOMNA PLANT SHIPS ITEM TO SATELLITES

BUILD NEW SHEARING, SPINNING, COMBING MACHINERY -- Moscow, Vechernyaya Moskva,  
 3 Apr 51

A shearing machine intended for finishing woolen cloth has been assembled at the Moscow Presnenskiy Machine-Building Plant. Pile, knots, and other defects are removed by this machine. It was developed by the plant's Design Bureau.

At present, the production of a new machine, a napping frame is being set up. This machine puts a nap on woolen and cotton cloth.

New Soviet wool-spinning frames have been shipped to textile mills in Moscow, Morshansk, Baku, and other cities.

To manufacture one napping frame, 70 shafts up to 4 meters long are required. It is impossible to manufacture them on existing machine tools. P. Volodenko, chief engineer at the plant, has suggested that the machine tools be rebuilt. The bed could be lengthened and new mechanisms could be erected, similar to the modern types of machine tools being produced by the Krasnyy proletariy Plant. Cutting speed has been increased four times on rebuilt machines.

At present, innovators are setting up centrifugal casting. This will permit the casting of complex gears.

Moscow, Moskovskaya Pravda, 19 Apr 51

The Moscow Presnenskiy Machine-Building Plant, a leading enterprise of the Ministry of Machine and Instrument Building, has started production of new high-duty machines for the textile industry.

- 1 -

**SECRET**

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50X1-HUM

Of great technical interest is a triple-combing apparatus for processing wool. This aggregate is made up of a large number of complex parts and occupies an area 17 meters long. Its productivity is nearly five times that of similar foreign machines.

The latest innovation at the plant is a shearing machine intended for finishing cloth.

Large machines are now assembled on conveyers, cutting assembly time almost in half in comparison with the previous year.

Moscow, Moskovskaya Pravda, 24 May 51

The Moscow Presnenskiy Machine-Building Plant produced only carding machines before the war. At present, it produces 30 different types of machines. During 1950 alone, the plant designed new machines for spinning wool, shearing machines, and napping frames, which it is now producing.

By the end of 1950, its output of products had increased to three times the 1946 level.

Series production of four types of complex machines has been started in 1951.

Burr extractors produced by this plant eliminate loss of wool, improve its quality, and yield a better grade of cloth.

MASTER PRODUCTION OF NEW WEAVING, WINDING MACHINES -- Moscow, Vechernyaya Moskva, 15 May 51

The Klimovsk Textile-Machine-Building Plant has mastered the production of new, modern, weaving automatics: the AT-175 for the cotton industry, the AT-175-Sh for the wool industry, and the AT-175-L for the linen industry.

Where the width of material woven on looms was previously one meter, it has been brought to 1.75 meters on the new automatics.

New models of unwinding and winding machines have been perfected at this plant also.

Moscow, Moskovskaya Pravda, 27 May 51

The textile industry has received a very useful unwinding machine, RM-150, from the Klimovsk Textile-Machine-Building Plant. This machine is the first to be produced in the Soviet Union. It unwinds yarn from skeins onto bobbins.

Tallin, Sovetskaya Estoniya, 5 Jun 51

The Klimovsk Machine-Building Plant, which is the largest manufacturer of equipment for the textile industry in the country, has started mass production of automatic looms. The first model of such a loom, on which linen cloth 175 centimeters wide can be woven, was shipped to the Smolensk Linen Combine.

- 2 -

S-E-C-R-E-T**SECRET**

**SECRET**

50X1-HUM

S-E-C-R-E-T

EXPORT NEW TEXTILE MACHINES TO PEOPLE'S DEMOCRACIES -- Moscow, Moskovskaya Pravda, 29 May 51

Textile workers in Leningrad, Riga, Narva, Orel, Tashkent, Alma-Ata, and Bukhara work on machines and spindles produced by the Kolomna Tekstil'mash Plant. This plant also sends its products to Noginsk, Ramenskoye, Ozery, and Yegor'yevsk. The well-known Dedovsk Cord Factory and the Glukhov Melange Combine work on spindles from the Kolomna Machine-Building Plant.

The Tekstil'mash trademark has won recognition among the people's democracies. Slubbing frames are sent to cities in Poland, Czechoslovakia, and Hungary. Recently, the first group of spindles was shipped to a cotton combine set up in a city in China.

A new type of knotting machine designed under the direction of Chumakov is now being developed. The new machine is being built by high-speed methods. Although the drawings have not yet been completed, separate units and parts are being manufactured at the shops. The productivity of the new machine will be five times greater than of old models. The exceptional feature of this machine is that it will tie the warp throughout its width simultaneously.

A very original type of spindle has been developed by A. S. Golovin, chief of the plant's experimental laboratory. In ordinary spindles, the blade revolves. In Golovin's design the blade is stationary, but the whorl and bobbin revolve. This eliminates blade vibration and greatly decreases thread breakage. Such a spindle can operate at a speed of 16,000 revolutions per minute. Metal required for its manufacture is 25 percent less than for a spindle with a revolving blade.

In June, the plant will put out the first 2,000 such spinning devices.

MANUFACTURE PRECISION PARTS FOR TEXTILE MACHINERY -- Moscow, Moskovskaya Pravda, 20 Apr 51

The Kuntsevo Platinum-Needle Plant is an enterprise singular in its technique and organization of production. The complexity of technique and technology can be judged by the fact that parts are processed here to an accuracy of thousandths of a millimeter; some of these parts weigh only 2 milligrams. Another unusual feature of the plant is that it produces millions of duplicate parts, yet it does not engage in mass production. This can be clarified simply: in the course of a year, 4,000 designated parts are produced by the plant. This means that the manufacture of 12-13 parts must be set up daily. Considering that during 1950 alone, nearly 800 new parts were perfected, the complexity of its organization is clear.

The plant makes knitting needles which are extremely accurate parts used for knitting heavy, closely knit woolen sweaters and sheer, caprone and silk stockings. There are thousands of different types of knitting needles. The production cycle for some of them lasts up to 40 days and consists of 52 operations. Aside from these needles the plant manufactures chiefly steel parts for hosiery and knitting machines, as well as so-called "platinums," fine needles, flat needles, and needles of most unusual shapes.

Spinning travelers (some of which weigh 3-5 milligrams) and millions of steel plates (a part intended for automatic stopping of a loom) have also been manufactured.

This plant supplies lace-producing factories with accurate, complex, and original shuttles. Finally, it supplies enterprises manufacturing synthetic fibers with spinnerets, which are cups made of a platinum-iridium alloy with thousands of very small precisely calibrated orifices. The largest of these

- 3 -

S-E-C-R-E-T**SECRET**

**SECRET**S-E-C-R-E-T

50X1-HUM

spinnerets has a 27-millimeter diameter, with 2,400 orifices in the head of the cup. The nature of production can be judged by the fact that the equipment of each worker includes a microscope of 80-100 magnifications and frequently an analytical balance.

During the first 10 months of 1949, the Kuntsev Plant did not operate efficiently. In November of that year, causes for the plant's shortcomings were uncovered and finally corrected. As of October 1950, the plant began to exceed its programs both in quality and quantity.

To insure that the plant would continue to operate efficiently, several measures were taken. Among these was the organization of conveyer production. At present, four conveyers are in operation, embracing 30 percent of all products produced. During 1951, this number will increase. The result of this measure is very significant: over-all plant output increased 29 percent and output of special types of parts tripled.

Fifty-eight special machines of original design were erected and put into operation at the plant.

DESIGN, APPLY MOISTURE-CONTENT REGULATORS IN TEXTILE INDUSTRY -- Leningradskaya Pravda, 21 Mar 51

An important process in the technology of cloth production is the preparation of yarn for ultimate weaving. First, the yarn is sized. Its quality depends to a large extent on the moisture content after impregnation and subsequent drying. Up to the present, the required moisture content within the range of 7-9 percent has not been achieved, and this has lowered the quality of the yarn.

An instrument called a moisture regulator has been designed for continuous and automatic determination and regulation of moisture content. Such instruments are being used successfully at the Factory imeni Petr Anisimov. As a result, steam consumption has been decreased nearly 40 percent, productivity has increased, and the conditions for subsequent processing of yarn in the weaving process have improved. By equipping all sizing machines with these instruments, the factory can save approximately 250,000 rubles per year.

This instrument can also be used at finishing, thread, cloth, and paper mills. At present, such instruments are being manufactured, with the aid of the Factory imeni P. Anisimov, at the Thread Mill of the Combine imeni S. M. Kirov and at the Glukhov Cotton Combine imeni V. I. Lenin.

The Ministry of Paper and Woodworking Industry directed that such an instrument be tested at the Paper Mill imeni Volodarskiy. However, for some reason or other, the carrying out of this directive has been delayed.

It is difficult to understand the sluggishness of the Ministry of Light Industry in this matter. Although enterprises of this industry are vitally interested in automatic moisture-content regulators, organization of their series production has not been undertaken.

PRODUCE COTTON-BATTING CARDING MACHINES -- Leningradskaya Pravda, 30 Mar 51

The production of cotton-batting carding machines has been mastered at the Leningrad Vulkan Plant. These machines are designed for the basic operation of converting cotton into batting.

- 4 -

S-E-C-R-E-T**SECRET**

**SECRET**S-E-C-R-E-T

50X1-HUM

TEST NEW CARDING MACHINE -- Minsk, Sovetskaya Belorussiya, 23 May 51

The Leningrad Kanat Factory has completed testing of a carding machine for processing hemp. The machine has processed approximately 100 tons of hemp. It can process about 1,500 kilograms of raw material per shift. Innovators are attempting to increase its productivity and make the processes automatic.

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- 6 -

S-E-C-R-E-T**SECRET**